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ABSTRACT

This paper attempts to provide a model that allows for individual evaluators to frame specific evaluation items based on a common set of beliefs (a philosophy) regarding the secondary school program for marketing and distributive education. It describes Popham's procedure for the development of domain specifications that frame the philosophical statement which are basic to making the determination about the merit of individual programs. Hambleton's adaptation of Popham's procedure is then outlined which suggests division of a domain specification into four parts: (1) skill (objective), (2) sample test item and directions, (3) content domain specifying objective content or providing rules for generating or delineating content, and (4) characteristics of answer choices and scoring which provide attributes of correct answers. The modified notions and procedures of Hambleton and Popham used to develop a methodology for evaluating the marketing and distributive education curriculum are then outlined. Four illustrations of domain specifications for evaluation are provided. Each follows this format: philosophical statement (skill), standard (test/evaluation item), content domain, and characteristics of answer choice/scoring. (YLB)

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DOMAIN SPECIFICATIONS AND EVALUATIVE CRITERIA FOR DISTRIBUTIVE EDUCATION

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Domain Specifications &

Evaluative Criteria for

Distributive Education Programs

The purpose of this paper was to develop domain specifications which can facilitate the making of decisions about the attainment of independent elements of a philosophy of distributive education. The framework is designed " . . . to spell out all the dimensions which will permit someone to create a set of evaluative techniques that will be viewed as congruent with the constraints set forth in the specifications". Philosophical statements as well as standards adopted by constituent groups in distributive education in the nation provided a basis for the specification of content domains and the determination of grading/scoring guidelines.

Domain Specifications and Evaluative Criteria for Marketing and Distributive Education Programs

The purpose of this paper was to develop domain specifications which can facilitate the making of decisions about the attainment of independent elements of a philosophy of marketing and distributive education. The framework is designed " . . . to spell out all the dimensions which will permit someone to create a set of evaluative techniques that will be viewed as congruent with the constraints set forth in the specifications." Philosophical statements as well as standards adopted by constituent groups in marketing and distributive education in the nation provided a basis for the specification of content domains and the determination of grading/scoring guidelines.

In 1975, Lucy Crawford validated a series of statements which came to be known as the "Philosophy of Distributive Education, 1975." All of the 114 basic belief statements included in the philosophy had been agreed upon by representatives of the affiliated organizations of marketing and distributive education--NASSDE, CDTE, NADET and NADELS.

A comprehensive statement of beliefs about a curriculum is basic to making the determination about the merit of individual programs. Unfortunately philosophical statements are not written at a level of specificity which can facilitate such a determination. In order for that to occur the tenets which act as a foundation for any curriculum have to be framed in a format which permits the overt examination of outcomes the program hopes to attain.

In recent years the educational objectives movement has been acclaimed as a panacea both for the evaluation of individual student achievement and for determing progress in educational curricula. Regrettably, as

educationists implemented the objectives strategy, they encountered problems. It appeared that, in many cases, the number of objectives that had to be described were so numerous or so trivial that efforts to measure their achievement were impossible. Contrariwise, when encompassing objectives were developed, they frequently were so vague that evaluation efforts were frequently idiosyncratic to the evaluator who was developing the testing instrument. Finally, even straightforward objectives oftentimes lacked sufficient clarity to permit the development of evaluation modes. For example, even a simple objective like "multiplying two digit numbers" may cause confusion among evaluators because it does not provide specificity of how many items should be used in the evaluation, the problem format (vertical versus horizontal), or the number of items.

To help overcome the problems described in the foregoing paragraph, Popham (1975, 1978) stated a procedure for the development of domain specifications. It consists of three major components:

1. The delineation of the behavior to be measured at an appropriate degree of generality.
2. The selection of a measurement alternative which provides optimal evidence of the attainment of objectives.
3. The actual preparation of domain specifications.

The framework is designed "to spell out all the initial and controlling dimensions which will permit someone to create a set of test items (evaluative techniques) that would, without exception, be viewed as congruent with the contraints set forth in the specifications." Hambleton (1980) has adapted Popham's procedures for the preparation of domain specifications which is better attuned to the needs of the project described in this paper.

His procedures suggest that a domain specification be divided into four parts:

1. The skill (objectives) itself.
2. A sample test item and directions.
3. The content domain which specifies the content of the objective or provides rules for generating or delineating the content.
4. Characteristics of answer choices and scoring which provide attributes of correct answers.

Perhaps the concepts that Popham and Hambleton might be better understood if an example of the procedures they advocate was provided. In illustration 1 an example of a domain specification for Reading Comprehension is provided. Examination of the illustration should help provide a more thorough understanding of the ideas presented in the previous discussion.

ILLUSTRATION 1: A Domain Specification

for Reading Comprehension

SKILL

A student will be able to identify the main idea of a paragraph by choosing the best title.

SAMPLE TEST DIRECTIONS AND TEST ITEM

Test Directions

Read each paragraph and choose the best title. Circle the letter beside your answer.

Test Item

The second grade went on a class trip. They saw airplanes and jets. A man told them how to buy an airline ticket. They saw the pilot's cockpit.

a. Meeting a pilot

b. Buying a ticket

c. A trip to the airport

CONTENT DOMAIN

1. Sentences should have no less than 3 words, and no more than 10.
2. Each paragraph should have no less than 3 sentences and no more than 7.
3. Compound and simple sentences should be included.
4. Readability should be approximately 2.5
5. The paragraphs should include both experience and interest-oriented subject matter.

CHARACTERISTICS OF ANSWER CHOICES AND SCORING

1. There should be three titles to choose from. The correct title is the main idea of the paragraph.
2. Distractors should contain smaller details from the paragraph.

In the current study the notions and procedures of Popham and Hambleton were modified so that a methodology for evaluating a curriculum was developed instead of one whose purpose was to measure achievement of individual student progress. The curriculum selected for evaluation was that of marketing and distributive education. Specifically domain specifications were written for philosophical statements adapted by the constituent groups of marketing and distributive education throughout the nation. Standards developed by the Lucas and Miles study (1978) provided a basis for the specification of content domain and determination of grading/scoring guidelines.

The manner by which the writers proceeded was similar to that described in the earlier example on achievement testing, with appropriate modifications. The philosophical statements themselves were taken to represent the skill (goal) that was to be developed by the curriculum. The standards determined in the Lucas & Miles study were interpreted as a sample evaluation procedure (test item) to gather data on the merit of a program. The content domain and answer choices were defined earlier. Perhaps several illustrations of domain specifications will serve to clarify the methodology. Please refer to examples provided in the paper.

ILLUSTRATION 2

Domain Specification for Evaluation

Philosophical Statement (Skill)

Periodic follow-up studies of marketing and distributive education graduates are essential to the evaluation of the effectiveness of marketing and distributive education programs.

Standard (Test/Evaluation Item)

One and five year follow-up studies are on file. Items reported may include employment status, continuing education status, perceived relevance of the M.D.E. program, and benefits perceived as a result of enrollment in the program.

Content Domain

1. The information will be gathered only from graduates who have completed the entire M.D.E. program (no dropouts).
2. The data will be collected by mail, personal interview and/or telephone survey.
3. Information gathered will include data about the following:
    a. jobs held since graduation
    b. the location of jobs
    c. salaries
    d. advanced training
    e. job satisfaction
    f. attitudes toward the M.D.E. program.
4. Information will be collected on each student one and five years after program completion.
5. Data collected must be able to be fitted into a quantifiable format.

Characteristics of Answer Choice/Scoring

1. The percent of respondents shall equal or exceed
    a. 80% of graduates after one year
    b. 60% of graduates after five years
2. Jobs held shall reflect an interest in marketing and distribution such that
    a. 80% of the graduates shall be in marketing positions after one year
    b. 50% of the graduates shall be in marketing positions after five years
3. Job titles, salaries and advanced training information shall have been recorded.
4. Data regarding student responses on attitude scales shall reflect a favorable attitude of at least 80% of the students toward
    a. their current job
    b. the M.D.E. program

ILLUSTRATION 3

Domain Specification for Evaluation

Philosophical Statement (Skill)

In selecting training agencies (stations) for marketing and distributive education students, every effort should be made to select those most likely to provide occupational and educational opportunities in keeping with the students' capabilities, interests, objectives and goals.

Standard (Test/Evaluation Item)

A training plan is on file for each student.

Content Domain

1. The training plan will contain the expressed job interest of the student.
2. The training plan contains appropriate educational and occupational opportunities for the student.

Characteristics of Answer Choice/Scoring

1. The career objective of the student is congruent with his/her expressed interest and is validated by the teacher for 90 percent of the enrollees.
2. The training plan will indicate a minimum of one on-the-job learning experience for each topic included in the curriculum.

ILLUSTRATION 4

Domain Specification for Evaluation

Philosophical Statement (Skill)

Students who enroll in the marketing and distributive education cooperative classes potentially should be able to represent the school on a satisfactory manner when in contact with business people of the community and the customers they serve.

Standard (Test/Evaluation-Item)

Students who enroll in the marketing and distributive education cooperative classes will obtain and maintain a position in distribution in line with their occupational objective.

Content Domain

1. The employment record of the student will be examined.
2. The congruence of student jobs to occupational objective will be scrutinized.

Characteristics of Answer Choice/Scoring

1. Eight/percent will obtain a position of employment in line with their career objective
2. Not more than 15 percent will lose their position because of unsatisfactory performance.

ILLUSTRATION 5

Domain Specification for Evaluation

Philosophical Statement (Skill)

The marketing distributive education program should serve people of diverse talents, abilitites, interests, and cultural backgrounds who want and can benefit from the instruction.

Standard (Test/Evaluation Item)

Evidence will be provided that the marketing and distributive education program was offered (made available) to students of diverse talents, abilities, interests, and cultural backgrounds represented in the total student population.

Content Domain

1. Percent of racial mix will be recorded.
2. Variability of I.Q. test scores will be evidenced.
3. Expression of interests in the program will be evidenced.
4. The attrition rate will be examined.

Characteristics of Answer Choice/Scoring

1. Racial mix will be within ten percent of the racial mix of the school population.
2. At least ten percent of the MDE students will come from the upper 25% of the school population in terms of I.Q. and at least 10 percent of the MDE students will come from the lower 25% of the school population in terms of I.Q.
3. At least 95% of the students in the program will have completed an application blank for admission to the MDE program indicating a desire to enroll in the MDE program.
4. The attrition for each year of the program will not exceed ten percent.

SUMMARY

Attempting to provide an evaluation instrument that has both universality of agreement and completeness is a worthy task. The authors have attempted to provide this model that allows for individual evaluators to frame specific evaluation items based on a common set of beliefs regarding the secondary school program for marketing and distributive education. Hopefully, this paper will provide a means to bring about a more meaningful evaluation for marketing and distributive education programs.

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